

November 17, 2021

**BY ELECTRONIC MAIL**

Luly E. Massaro, Commission Clerk  
Rhode Island Public Utilities Commission  
89 Jefferson Boulevard  
Warwick, RI 02888

**RE: Docket 5099 – FY 2022 Gas Infrastructure, Safety, and Reliability Plan  
Quarterly Update – Second Quarter Ending September 30, 2021**

Dear Ms. Massaro:

On behalf of National Grid,<sup>1</sup> I have enclosed an electronic version of the Company's fiscal year (FY) 2022 Gas Infrastructure, Safety, and Reliability (ISR) Plan quarterly update for the fourth quarter ending September 30, 2021.<sup>2</sup>

Pursuant to the provisions of the approved FY 2018 Gas ISR Plan, the Company committed to providing quarterly updates on the progress of its Gas ISR program to the Rhode Island Public Utilities Commission and the Rhode Island Division of Public Utilities and Carriers.

Thank you for your attention to this matter. If you have any questions, please contact me at 781-907-2121.

Very truly yours,



Raquel J. Webster

Enclosures

cc: Docket 5099 Service List  
Leo Wold, Esq.  
John Bell, Division  
Al Mancini, Division

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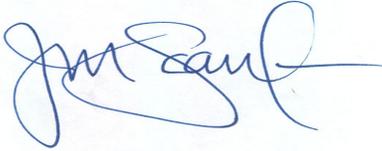
<sup>1</sup> The Narragansett Electric Company d/b/a National Grid (National Grid or the Company).

<sup>2</sup> Per a communication from Commission counsel on October 4, 2021, the Company is submitting an electronic version of this filing followed by six (6) hard copies filed with the Clerk within 24 hours of the electronic filing.

Certificate of Service

I hereby certify that a copy of the cover letter and any materials accompanying this certificate was electronically transmitted to the individuals listed below.

The paper copies of this filing are being hand delivered to the Rhode Island Public Utilities Commission and to the Rhode Island Division of Public Utilities and Carriers.



\_\_\_\_\_  
Joanne M. Scanlon

November 17, 2021  
Date

**Docket No. 5099- National Grid’s FY 2022 Gas Infrastructure, Safety and Reliability (ISR)  
Plan - Service List 4/1/2021**

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## **Gas Infrastructure, Safety and Reliability Plan**

### **The Narragansett Electric Company**

#### **FY 2022 Quarterly Update**

#### **Second Quarter – Ending September 30, 2021**

##### **Executive Summary**

Fiscal year (FY) 2022 Gas Infrastructure, Safety and Reliability (ISR) second quarter results ([Attachment A](#)) reflect that the Company<sup>1</sup> has spent approximately \$73.19 million of an estimated year-to-date (YTD) budget of \$97.91 million, resulting in a second quarter underspending variance of \$24.72 million. This spending does not include the Southern Rhode Island Gas Expansion Project. The second quarter spend includes actual spending of \$21.84 million out of an estimated YTD budget of \$24.49 million for Non-Discretionary work, resulting in a second quarter underspending variance of \$2.65 million. In addition, the second quarter spend includes actual spending of \$51.35 million out of an estimated YTD budget of \$73.42 million on Discretionary work, resulting in a second quarter underspending variance of \$22.07 million.

To date, the \$73.19 million of actual spend represents approximately 48 percent of the total FY 2022 annual Gas ISR budget of \$153.81 million (including incremental costs). As of September 30, 2021, the forecasted total year-end spend was \$139.40 million, which was \$14.41 million below the total budget of \$153.81 million (including incremental costs). A summary forecast is provided in [Attachment A](#). Additional details supporting this forecast are provided in [Attachment B](#). In the sections below, the Company explains in more detail the primary drivers for spending to-date and the forecast for each category.

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<sup>1</sup> The Narragansett Electric Company d/b/a National Grid (National Grid or the Company).

FY 2022 Gas ISR second quarter results (Attachment A) reflect that the Company has spent \$10.72 million of an estimated YTD budget of \$11.67 million for the Southern Rhode Island Gas Expansion Project (Gas Expansion Project). This results in a second quarter underspending variance of \$0.95 million. YTD results (Attachment B) reflect that the Company spent approximately \$10.24 million for Construction – Pipeline compared to a YTD budget of \$10.59 million, resulting in a fiscal YTD underspending variance of \$0.35 million. For the Other Upgrades/Investments category, the Company has completed the Maximum Operating Pressure (MOP) increase from 150 pounds per square inch gauge (psig) to 200 psig of the existing main in Cranston and West Warwick. The Company is also continuing preparation for updates at the existing Cowesett Regulator Station along with planning, engineering, and site planning, for a new regulator station near the existing Cowesett regulator station. The Company forecasts that the Gas Expansion Project category will be underbudget by \$1.71 million at fiscal year-end.

### **FY 2022 Capital Spending by Category**

#### ***Non-Discretionary Work<sup>2</sup>***

##### ***Public Works Program – \$0.73 million variance over year-to-date budget***

Through the second quarter of FY 2022, the Company spent a \$13.22 million, net reimbursements, against a projected year-to-date budget of \$12.49 million for the Public Works program, resulting in an overspending variance of \$0.73 million. Through the end of Q2 FY 2022, the Company installed 6.3 miles of a plan of 10.0 miles for new gas main and has abandoned 7.0 miles of a plan of 10.6 miles of leak-prone pipe through the Public Works program. The Company forecasts that FY 2022 Reimbursable work will come in \$1.04 million higher than budget and that Reimbursements (credits) will come in \$0.50 million higher than

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<sup>2</sup> Non-Discretionary programs include projects that are required by legal, regulatory code, and/or agreement, or are the result of damage or failure, with limited exceptions.

budget. As a result, the Company projects that the Public Works Program category will be over budget by \$0.55 million at fiscal year-end.

***Mandated Programs – \$3.25 million underspending variance to budget year-to-date***

Through the second quarter of FY 2022, the Company spent approximately \$8.62 million of a projected YTD budget of \$11.87 million for Mandated Programs, resulting in an underspending variance of \$3.25 million. Please note that a total of \$0.82 million for Incremental Paving – Patches was allocated to the annual budgets of three Mandated programs. Please see Attachment C for a breakdown of the budget allocations. The primary driver of the underspend in the Mandated category is lower than anticipated costs accumulating in the Reactive Leaks categories (CI Joint Encapsulation/Service Replacement). However, as the Company continues to review FY 2022 work orders, the Company anticipates that charges are likely to increase in these categories. The Company forecasts that it will be underbudget by \$1.00 million for the Reactive Leaks category at year-end. Overall, as of September 30, 2021, the Mandated programs forecasted total year-end spend was \$23.62 million or \$1.42 million more than the budget. The primary drivers of the projected overspend are the Maintenance and Corrosion categories. The forecast for the maintenance category has been lowered since Q1 FY 2022, as the Reservoir Avenue project in Cranston will likely be deferred until FY 2023. The Oxbow Farms project in Middletown remains in the FY 2022 forecast and is continuing development as a main replacement job, but the Company will discuss options with the housing development owner prior to construction. The forecast for the Corrosion is higher than budget because the Company has been performing a higher volume of repair work than was budgeted.

In June 2021, the Company, in collaboration with the Rhode Island Division of Public Utilities and Carriers (Division), developed and implemented a plan to continuously improve the Company's tracking of its meter inventory and its purchasing strategies. This was implemented in compliance with Rhode Island Public Utilities Commission (PUC) Order in Docket 5099,

National Grid’s FY 2022 Gas ISR Plan. The first component of the plan is an enhanced process to track meter inventory. The Company is conducting a manual count of the meter lab inventory each month until the Company has validated that the Maximo system (system) is accurately capturing inventory data. The Company conducted a physical inventory count on June 10, 2021 to establish the baseline count. The chart below provides a summary of the meter lab inventory counts on June 10, 2021, June 30, 2021, and September 30, 2021. The Company is currently reviewing any variances between the physical counts and the meter inventory tracked in Maximo and anticipates the variance between the physical count and Maximo will continue to be reduced to a minimal amount. The Company is reviewing and addressing factors that contribute to the variance, including the timing of when inventory is counted and reports are run and the timing of data cleanup in the Maximo system.

<b>Meter Lab Inventory</b>				
<b>Measure</b>	<b>Physical Count</b>	<b>Maximo</b>	<b>Variance</b>	<b>Variance %</b>
<b>Inventory as of 6/10/2021</b>	9,943	10,926	983	9%
<b>Inventory as of 6/30/2021</b>	9,156	9,988	823	8%
<b>Inventory as of 9/30/2021</b>	9,568	10,370	802	8%

***Damage/Failure Reactive Program – \$0.13 million variance to budget year-to-date***

Through the second quarter of FY 2022, the Company spent \$0 of a projected year-to-date budget of \$0.13 million for the Damage/Failure Reactive program, resulting in an underspending variance of \$0.13 million. At this time, the Company forecasts that the Damage/Failure Reactive program category will be underbudget at fiscal year-end.

### ***Discretionary Work<sup>3</sup>***

#### ***Proactive Main Replacement Program – \$13.15 million underspending variance to budget year-to-date***

Through the second quarter of FY 2022, the Company spent approximately \$41.55 million of a projected YTD budget of \$54.69 million for the Proactive Main Replacement programs, resulting in an underspending variance of approximately \$13.15 million. Please note that approximately \$2.84 million for Incremental Paving – Main Installation was allocated to the Leak Prone Pipe annual budget. Please see Attachment C for a breakdown of the budget allocations. Through Q2 FY 2022 in the Proactive Main Replacement (MRP) Program, the Company installed 31.6 miles of new main against a plan of 32.3 miles. Across all ISR programs, the Company installed a total of 38.4 miles of new main against a plan of 45.8 miles. Through Q2 FY 2022, the Company abandoned 24.5 miles in the MRP Program against a plan of 29.7 miles. Across all ISR programs, the Company abandoned 31.2 miles against an overall plan of 47.0 miles. Of the 31.2 miles abandoned, 24.1 miles were associated with prior year carryover work, meaning that the associated new main was installed prior to the beginning of FY 2022. The Company started FY 2022 with 34.4 miles of carryover main to be abandoned in the current fiscal year.

The number of YTD leak prone pipe miles abandoned has been impacted by the availability of internal main connection crews. Along with leak prone pipe abandonments, the Company also prioritized Regulator Station work that was in progress to ensure that work is completed prior to cold weather to minimize risk on the gas system. Additionally, the Company's crew counts continue to be impacted by longer term absences, which have increased since the start of the COVID-19 Pandemic ("Pandemic").

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<sup>3</sup> Discretionary programs are not required by legal, regulatory code, or agreement, or a result of damage or failure, with limited exceptions.

For the Atwells Avenue Project, the Company is continuing to work in conjunction with the City of Providence on the final restoration of Segments 1A and 1B. The Company is following a construction schedule that includes paving in segments as the City of Providence completes its sidewalk restoration; the first segment of paving began in August 2021. In terms of the prioritization of overall work in the City of Providence, the Company has been working in close conjunction with Providence Water (replacing pipe) and the City of Providence's Paving Plan (replacing leak prone main ahead of municipal paving). Based on that prioritization, construction for Segment 3 has not been started and due to the high volume of associated service and meter work, that segment has now been deferred to FY 2023 and was included in the FY 2023 ISR Proposal submitted to the Division on October 4, 2021.

***Proactive Service Replacement Program – \$0.09 million underspending variance to budget year-to-date***

Through the second quarter of FY 2022, the Company spent \$0.22 million of a projected YTD budget of \$0.31 million for the Proactive Service Replacement Program, resulting in an underspending variance of \$0.09 million. The Company is continuing to focus on replacing the copper services located in Cumberland and has replaced 37 services YTD, with 43 remaining in Cumberland. As of October 2021, all remaining Cumberland copper services are isolated to one street, Sun Valley Road. At this time, the Company forecasts that the Proactive Service Replacement Program category will be overbudget by \$0.08 million at fiscal year-end, due to costs associated with final restoration patching for work completed in FY 2021 and some FY 2022 work.

***Reliability Programs – \$8.84 million underspending variance to budget year-to-date***

Through the second quarter of FY 2022, the Company spent \$9.58 million of a projected YTD budget of \$18.42 million for Reliability programs, resulting in an underspending variance of

\$8.84 million for this category. As of September 30, 2021, the Company projected that the Reliability programs would be underbudget by \$3.62 million at fiscal year-end. There are several drivers of this current underspending variance, most of which are due to timing delays for some of the planned work. At a category level, the first driver is project development delays with the Dey Street project within the Heater Installation Program. The Company's FY 2022 budget assumed the project would be constructed during the current fiscal year. However, development has been deferred until FY 2023, and construction has been deferred until FY 2024, as described in the FY 2023 ISR Proposal materials submitted to the Division on October 4, 2021. The second driver is the availability of crews to complete live gas connections for the projects within the Pressure Regulating Facilities category (along with other Reliability categories). The category is underbudget through Q2 but has four sites in progress, which the Company forecasts will be overbudget at year end, as contractors will be performing work at two stations, and the Company will be purchasing long lead time materials needed for FY 2023 construction. The third driver is timing delays associated with the East Providence De-rating (downrating) Project and permitting for two locations in Newport (eliminate single-feed) within the Gas System Reliability category; all three have been deferred and included within the FY 2023 ISR Proposal. The fourth driver is the I&R Reactive category, which is underbudget through Q2, but is forecast to be overbudget at fiscal year-end. Additional funds will be used for reactive work, to increase the rate of regulator replacements, increase the rate of pilot replacements, and replace older style odorant systems. The fifth driver is the LNG category, which is experiencing delays with the Exeter Boiloff Compressor and Emergency Shutdown System (ESD) System Installation. However, the forecasted underspend on those two elements is offset by higher forecasted costs for the Exeter High Expansion Foam System along with costs related to the existing Old Mill Lane site, which include site enhancements to reduce the noise impact to residential neighbors. The sixth driver is the Replace Pipe on Bridges category, which the Company forecasts will be underbudget by \$1.73 million because the Goat Island Bridget project in Newport has not been advanced by the Rhode Island Department of Transportation

(RIDOT). Additionally, the Company forecasts that the Tools & Equipment category will be overbudget by \$1.25 million at fiscal year-end as the Company needs to replace certain tools and equipment that are experiencing greater wear and tear due to the type and volume of work being performed by Company crews. The Company is also purchasing certain specialty equipment that will no longer be available to borrow from the Boston Gas Company once the sale of the assets to PPL is complete, such as Kleiss systems, Williamson equipment, and hole hogs.

### **FY 2022 Southern Rhode Island Gas Expansion Project Spending by Category**

#### ***Construction***

##### ***Pipeline – \$0.35 million underspending variance to budget year-to-date***

Through the second quarter of FY 2022, the Company spent \$10.24 million of a projected YTD budget of \$10.59 million for the Gas Expansion Project – Main Installation, resulting in an underspending variance of \$0.35 million for this category. Through the second quarter of FY 2022, the Company has now gassed in all the Phase 2 and Phase 3 gas main through South Road and final restoration has been completed in those areas. Through September 20, 2021, the Company and its Contractor have completed fitting replacements at 13 of 15 locations along the project's main installation route, with the remaining 2 expected to be completed by the end of October, with final restoration to follow afterwards. The associated main will be gassed in by November 1, 2021. At this time, the Gas Expansion Project – Main Installation category is forecasted to be on budget at fiscal year-end.

### ***Other Upgrades/Investments***

#### ***Maximum Operating Pressure (MOP) Project, Launcher/Receiver, Installation of Remote Operating Valve (ROV) – \$0.52 million underspending variance to budget year-to-date***

Through the second quarter of FY 2022, the Company spent \$0.37 million of a projected YTD budget of \$0.88 million for the Other Upgrades/Investments category, resulting in an underspending variance of \$0.52 million for this category. The Cranston Line MOP increase to 200 pounds per square inch gauge (psig) was successfully completed at the end of August. At this time, the Other Upgrades/Investments category is projected to be underbudget at fiscal year-end by \$1.36 million, as the forecast was adjusted to align with the current cost estimate for work to be completed in FY 2022 and the construction phase of the Launcher/Receiver and Installation of ROV work was deferred until FY 2025, so some associated preparation was also deferred.

### ***Regulator Station Investment***

#### ***Updates to Cranston Take Station, Cowesett Regulator Station, and New Regulator Station – \$0.08 million underspending variance to budget year-to-date***

Through the second quarter of FY 2022, the Company spent \$0.12 million of a projected YTD budget of \$0.20 million for the Regulator Station Investment category, resulting in an underspending variance of \$0.08 million for this category. The Company is continuing preparation for updates at the existing Cowesett Regulator Station along with planning, engineering, and site planning, for a new regulator station near the existing Cowesett regulator station. The FY 2022 forecast also includes costs for procurement of materials in preparation for FY 2023 construction related to the updates at the existing Cowesett Regulator Station. At this time, the Company forecasts that the Regulator Station Investment category will be underbudget by \$0.35 million at fiscal year-end.

Attachment A  
RIPUC Docket No. 5099  
FY 2022 Gas Infrastructure, Safety, and Reliability Plan  
FY 2022 Quarterly Update

Attachment A - Summary

**The Narragansett Electric Company**  
d/b/a National Grid - RI Gas  
**Capital Spending by Investment Categories - Summary**  
FY 2022 through September 30, 2021  
(\$000)

Categories	FYTD			FY 2022 - Total		
	Budget	Actual	Variance	Budget	Forecast	Variance
<b>NON-DISCRETIONARY</b>						
Public Works <sup>1</sup>	\$12,493	\$13,222	\$729	\$19,202	\$19,747	\$545
Mandated Programs	\$11,873	\$8,619	(\$3,254)	\$22,203	\$23,624	\$1,421
Damage / Failure (Reactive)	\$125	\$0	(\$125)	\$250	\$145	(\$105)
<b>NON-DISCRETIONARY TOTAL</b>	<b>\$24,491</b>	<b>\$21,842</b>	<b>(\$2,649)</b>	<b>\$41,655</b>	<b>\$43,516</b>	<b>\$1,861</b>
<b>DISCRETIONARY</b>						
Proactive Main Replacement	\$54,693	\$41,547	(\$13,146)	\$77,871	\$65,138	(\$12,733)
Proactive Service Replacement	\$312	\$224	(\$88)	\$350	\$430	\$80
Reliability	\$18,415	\$9,575	(\$8,840)	\$33,932	\$30,316	(\$3,616)
<b>SUBTOTAL DISCRETIONARY (Without Gas Expansion)</b>	<b>\$73,419</b>	<b>\$51,345</b>	<b>(\$22,074)</b>	<b>\$112,153</b>	<b>\$95,884</b>	<b>(\$16,269)</b>
Southern RI Gas Expansion Project	\$11,671	\$10,724	(\$948)	\$19,438	\$17,728	(\$1,710)
<b>DISCRETIONARY TOTAL (With Gas Expansion)</b>	<b>\$85,090</b>	<b>\$62,069</b>	<b>(\$23,022)</b>	<b>\$131,591</b>	<b>\$113,612</b>	<b>(\$17,979)</b>
<b>CAPITAL ISR TOTAL (Base Capital - Without Gas Expansion)</b>	<b>\$97,910</b>	<b>\$73,187</b>	<b>(\$24,723)</b>	<b>\$153,808</b>	<b>\$139,400</b>	<b>(\$14,408)</b>
<b>CAPITAL ISR TOTAL (With Gas Expansion)</b>						
Includes incremental paving associated with new RI Paving Law <sup>2</sup> and PE Stamps	\$109,581	\$83,911	(\$25,671)	\$173,246	\$157,128	(\$16,118)
<b>Additional Capital Investments</b> (Not currently included in the ISR)	\$1,675	\$449	(\$1,226)	\$6,900	\$4,316	(\$2,584)

( ) in Variance column denotes an underspend

1. Public Works Program includes reimbursements which will be credited as received throughout the year.

2. Budgets for Incremental Paving (Main Installation - \$3.019M; Patches - \$0.823M) were allocated to ISR categories that are forecasted to incur the incremental paving costs. See Attachment C - Incremental Paving Budget Allocations.

Attachment B  
RIPUC Docket No. 5099  
FY 2022 Gas Infrastructure, Safety, and Reliability Plan  
FY 2022 Quarterly Update

Attachment B - Breakout

**The Narragansett Electric Company  
d/b/a National Grid - RI Gas  
Capital Spending by Investment Categories - Detail  
FY 2022 through September 30, 2021  
(\$000)**

Categories	FYTD			FY 2022 - Total		
	Budget	Actual	Variance	Budget	Forecast	Variance
<b>NON-DISCRETIONARY</b>						
<b>Public Works</b>						
<i>CSC/Public Works - Non-Reimbursable</i>	\$12,468	\$11,828	(\$640)	\$19,152	\$19,152	\$0
<i>CSC/Public Works - Reimbursable</i>	\$727	\$1,808	\$1,081	\$1,455	\$2,499	\$1,044
<i>CSC/Public Works - Reimbursements</i>	(\$702)	(\$413)	\$289	(\$1,405)	(\$1,904)	(\$499)
<b>Public Works Total</b>	<b>\$12,493</b>	<b>\$13,222</b>	<b>\$729</b>	<b>\$19,202</b>	<b>\$19,747</b>	<b>\$545</b>
<b>Mandated Programs</b>						
<i>Corrosion</i>	\$478	\$1,434	\$955	\$1,250	\$2,250	\$1,000
<i>Purchase Meter (Replacement)</i>	\$1,668	\$1,443	(\$225)	\$2,880	\$2,880	\$0
<i>Reactive Leaks (CI Joint Encapsulation/Service Replacement)</i>	\$6,984	\$4,066	(\$2,918)	\$12,629	\$11,629	(\$1,000)
<i>Service Replacement (Reactive) - Non-Leaks/Other</i>	\$1,464	\$555	(\$908)	\$2,016	\$1,616	(\$400)
<i>Main Replacement (Reactive) - Maintenance (incl Water Intrusion)</i>	\$340	\$943	\$603	\$1,188	\$4,188	\$3,000
<i>Low Pressure System Elimination (Proactive)</i>	\$250	\$9	(\$241)	\$500	\$400	(\$100)
<i>Transmission Station Integrity</i>	\$689	\$169	(\$520)	\$1,740	\$661	(\$1,079)
<b>Mandated Total</b>	<b>\$11,873</b>	<b>\$8,619</b>	<b>(\$3,254)</b>	<b>\$22,203</b>	<b>\$23,624</b>	<b>\$1,421</b>
<b>Damage / Failure (Reactive)</b>						
<i>Damage / Failure (Reactive)</i>	\$125	\$0	(\$125)	\$250	\$145	(\$105)
<b>NON-DISCRETIONARY TOTAL</b>	<b>\$24,491</b>	<b>\$21,842</b>	<b>(\$2,649)</b>	<b>\$41,655</b>	<b>\$43,516</b>	<b>\$1,861</b>
<b>DISCRETIONARY</b>						
<b>Proactive Main Replacement</b>						
<i>Main Replacement (Proactive) - Leak Prone Pipe</i>	\$49,041	\$39,227	(\$9,814)	\$70,019	\$61,072	(\$8,947)
<i>Main Replacement (Proactive) - Large Diameter LPCI Program</i>	\$2,651	\$1,939	(\$713)	\$3,852	\$2,867	(\$985)
<i>Atwells Avenue</i>	\$3,000	\$381	(\$2,619)	\$4,000	\$1,200	(\$2,800)
<b>Proactive Main Replacement Total</b>	<b>\$54,693</b>	<b>\$41,547</b>	<b>(\$13,146)</b>	<b>\$77,871</b>	<b>\$65,138</b>	<b>(\$12,733)</b>
<b>Proactive Service Replacement</b>						
<b>Proactive Service Replacement Total</b>	<b>\$312</b>	<b>\$224</b>	<b>(\$88)</b>	<b>\$350</b>	<b>\$430</b>	<b>\$80</b>
<b>Reliability</b>						
<i>System Automation</i>	\$660	\$491	(\$169)	\$1,321	\$1,000	(\$321)
<i>Heater Installation Program</i>	\$1,359	\$141	(\$1,218)	\$3,557	\$1,375	(\$2,182)
<i>Pressure Regulating Facilities</i>	\$5,970	\$3,665	(\$2,304)	\$7,462	\$8,857	\$1,395
<i>Allens Ave Multi Station Rebuild</i>	\$1,540	\$1,524	(\$16)	\$2,500	\$2,500	\$0
<i>Take Station Refurbishment</i>	\$650	\$210	(\$440)	\$1,300	\$1,958	\$658
<i>Valve Installation/Replacement (incl Storm Hardening &amp; Middletown/Newport)</i>	\$114	\$72	(\$42)	\$1,233	\$366	(\$867)
<i>Gas System Reliability</i>	\$2,044	\$109	(\$1,935)	\$3,244	\$970	(\$2,274)
<i>I&amp;R - Reactive</i>	\$687	\$32	(\$655)	\$1,348	\$1,848	\$500
<i>Distribution Station Over Pressure Protection</i>	\$924	\$1,563	\$639	\$3,301	\$3,752	\$451
<i>LNG</i>	\$2,843	\$1,178	(\$1,665)	\$5,738	\$5,237	(\$501)
<i>Replace Pipe on Bridges</i>	\$1,103	\$72	(\$1,032)	\$2,006	\$281	(\$1,725)
<i>Access Protection Remediation</i>	\$210	\$47	(\$163)	\$310	\$310	\$0
<i>Tools &amp; Equipment</i>	\$312	\$470	\$158	\$612	\$1,862	\$1,250
<b>Reliability Total</b>	<b>\$18,415</b>	<b>\$9,575</b>	<b>(\$8,840)</b>	<b>\$33,932</b>	<b>\$30,316</b>	<b>(\$3,616)</b>
<b>SUBTOTAL DISCRETIONARY (Without Gas Expansion)</b>	<b>\$73,419</b>	<b>\$51,345</b>	<b>(\$22,074)</b>	<b>\$112,153</b>	<b>\$95,884</b>	<b>(\$16,269)</b>
<b>Southern RI Gas Expansion Project</b>						
<i>Pipeline</i>	\$10,585	\$10,237	(\$348)	\$14,908	\$14,908	\$0
<i>Other Upgrades/Investments</i>	\$884	\$366	(\$518)	\$2,930	\$1,570	(\$1,360)
<i>Regulator Station Investment</i>	\$202	\$121	(\$81)	\$1,600	\$1,250	(\$350)
<b>Southern RI Gas Expansion Project Total</b>	<b>\$11,671</b>	<b>\$10,724</b>	<b>(\$948)</b>	<b>\$19,438</b>	<b>\$17,728</b>	<b>(\$1,710)</b>
<b>DISCRETIONARY TOTAL (With Gas Expansion)</b>	<b>\$85,090</b>	<b>\$62,069</b>	<b>(\$23,022)</b>	<b>\$131,591</b>	<b>\$113,612</b>	<b>(\$17,979)</b>
<b>CAPITAL ISR TOTAL (Base Capital - Without Gas Expansion)</b>	<b>\$97,910</b>	<b>\$73,187</b>	<b>(\$24,723)</b>	<b>\$153,808</b>	<b>\$139,400</b>	<b>(\$14,408)</b>
<b>CAPITAL ISR TOTAL (With Gas Expansion)</b>						
Includes incremental paving associated with new RI Paving Law <sup>1</sup>	\$109,581	\$83,911	(\$25,671)	\$173,246	\$157,128	(\$16,118)
<b>Additional Capital Investments (Not currently included in the ISR)</b>						
<i>Aquidneck Island Long Term Capacity Options</i>	\$1,355	\$376	(\$979)	\$4,900	\$3,842	(\$1,058)
<i>LNG - Cumberland Tank Replacement</i>	\$320	\$73	(\$247)	\$2,000	\$474	(\$1,526)

1) Budgets for Incremental Paving (Main Installation - \$3.019M; Patches - \$0.823M) were allocated to ISR categories that are forecasted to incur the incremental paving costs.

Attachment C  
RIPUC Docket No. 5099  
FY 2022 Gas Infrastructure, Safety, and Reliability Plan  
FY 2022 Quarterly Update

Attachment C - Incremental Paving Budget Allocations

**The Narragansett Electric Company  
d/b/a National Grid - RI Gas  
Incremental Paving Budget Allocations - Detail  
(\$000)**

Incremental Paving Budget	ISR Category	Subcategory	Category Budget ISR Approved	Incremental Paving Budget Allocation	Updated Budget with Paving Allocation
Incremental Paving - Main Installation	Main Replacement (Proactive) - Leak Prone Pipe	Main Replacement (Proactive) - Leak Prone Pipe	\$ 67,176	\$ 2,843	\$ 70,019
Incremental Paving - Main Installation	Gas System Reliability	Gas Planning	\$ 3,068	\$ 176	\$ 3,244
		<b>Incremental Paving - Main Installation - Total Budget</b>		<b>\$ 3,019</b>	
Incremental Paving - Patches	Reactive Leaks (CI Joint Encapsulation/ Service Replacement)		\$ 11,973	\$ 656	\$ 12,629
Incremental Paving - Patches	Service Replacements (Reactive) - Non-Leaks/Other	Service Replacements (Reactive) - Non- Leaks/Other	\$ 1,911	\$ 105	\$ 2,016
Incremental Paving - Patches	Main Replacement (Reactive) - Maintenance (incl Water Intrusion)		\$ 1,126	\$ 62	\$ 1,188
		<b>Incremental Paving - Patches - Total Budget</b>		<b>\$ 823</b>	